

Panel experts outline risks of vinyl chloride exposure

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Vinyl chloride is a colorless gas which mixes with water but evaporates when exposed air. When exposed to sunlight, the gas rapidly degrades and becomes harmless. The substance is commonly used to make poly vinyl chloride, a hard plastic used for materials such as PVC pipe.

The class A carcinogen is also found in cigarette and cigar smoke and was once used as an ingredient in some cosmetics.

The vinyl chloride detected in groundwater samples around the old Camden County landfill is suspected to have leaked from the facility which closed around 1981.

The Environmental Protection Agency requires that drinking water levels of vinyl chloride not exceed two parts per billion, or a level of .002 micrograms per liter.

Measurements of vinyl chloride in recent spot checks around the landfill reveal levels as high as 1,400 parts per billion in groundwater. Tests near the entrance to Crooked River Plan-

tation have revealed levels above 30 parts per billion.

During the lifespan of the old landfill, no strict record keeping laws were in place to monitor waste put in the trenches. But officials believe that the solvent by-product probably originated as drycleaning fluids, Liquid Gold or other common cleaning solvents. The disposal of as little as a one gallon container of drycleaning solvents could produce the westward flow that now exists.

Other landfills across the country are dealing with this typical problem, environmental consultants said.

Vinyl chloride is one of 13 carcinogens proven to cause cancer in man, according to environmental consultant Dr. Marland D. Dulaney, Jr.

Studies show that ingestion of the substance for long periods of time at high concentrations has caused cancer. The substance was discovered to be a carcinogen in the plastics industry, when 120 men working directly with "tremendous doses" of poly vinyl chloride on a daily basis devel-

## What is vinyl chloride?

- Vinyl chloride, a known cause of cancer, is a by-product of cleaning solvents, such as Liquid Gold and chemicals used for the drycleaning process.
- Although it cannot be absorbed through skin, the substance mixes with water and evaporates when it is exposed to the air. Upon evaporation, vinyl chloride can be inhaled and, in high concentrations, could be unhealthy.

oped cancer, Dulaney said.

While swimming in a pool or playing in a sprinkler supplied by a groundwater well is not considered a high risk because vinyl chloride is not absorbed through the skin, officals are asking Crooked River residents not to use groundwater wells and pools or irrigation systems supplied with this well water until further notice.

"Keep in mind, EPA standards are extremely conservative. Risks here appear to be very low, nevertheless there is a requirement to clean up," consultant Dr. Michael A. Keirn said.